



A Practical Path Forward

While we work to address the challenges, the most immediate way to reduce carbon emissions is through a mix of electrified options, which includes battery electric, plug-in hybrid, and hybrid vehicles.

Taking limited battery resources and sharing them among different options allows lower carbon options in every vehicle segment, will get more customers, regardless of status or income, in electrified vehicles, and will take more carbon off the road.

The 1:6:90 Rule

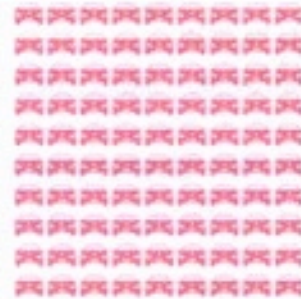
The amount of raw materials in one long-range battery electric vehicle could instead be used to make 6 plug-in hybrid electric vehicles or 90 hybrid electric vehicles. For the same limited resources, instead of replacing one internal combustion engine vehicle, you can replace 90. **The overall carbon reduction of those 90 hybrids over their lifetimes is 37 times as much as a single battery electric vehicle.**



1 Battery Electric Vehicle



6 Plug-in Hybrid Electric Vehicles



90 Hybrid Electric Vehicles

Delivering on Toyota's Goal

Toyota has sold 22.8 million electrified vehicles globally in the past 25 years, the equivalent carbon reduction of 7.5 million battery electric vehicles.

Toyota believes in an electric future. But there are significant challenges to widespread deployment that we must address first to get there.

An 'all of the above' electrification strategy is the bridge to get us to overall lower carbon emissions.

¹ See Kinja's [2022-2023 Vehicle Sales Forecast](https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast), <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.

² <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.

³ <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.

⁴ <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.

⁵ McKinsey & Company, [Building the electric vehicle charging infrastructure build-out needed](https://www.mckinsey.com/industries/automotive/our-insights/accelerating-vehicle-charging-infrastructure-build-out-needed), <https://www.mckinsey.com/industries/automotive/our-insights/accelerating-vehicle-charging-infrastructure-build-out-needed>.

⁶ <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.

⁷ Kinja's [2022-2023 Vehicle Sales Forecast](https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast), <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.

⁸ <https://www.kinja.com/insights/industry/2022-2023-vehicle-sales-forecast>, 2022.